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10/766,843	01/30/2004	Nicolas Drevon	Q79623	4578
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EXAMINER RUTKOWSKI, JEFFREY M				
ART UNIT		PAPER NUMBER		
2473				
NOTIFICATION DATE		DELIVERY MODE		
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary

Application No.

10/766,843

Applicant(s)

DREVN ET AL.

Examiner

JEFFREY M. RUTKOWSKI

Art Unit

2473

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 20 July 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4, 6-8 and 10-36 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4, 6-8, 10-14 and 20-36 is/are rejected.
- 7) ☒ Claim(s) 15 and 17-19 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/808)
- 4) ☐ Interview Summary (PTO-413)
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Claims 5 and 9 have been cancelled.

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first and second paragraphs of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. **Claims 20-34** are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The specification does not describe any structure that corresponds to the claimed means.
3. **Claims 20-34** are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. It is not clear what structure corresponds to the claimed means.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

7. **Claims 1-4, 6, 10-14 and 16** are rejected under 35 U.S.C. 103(a) as being unpatentable over Kekki (US Pg Pub 2003/0161325) in view of Soldani et al. (US Pg Pub 2004/0110521), hereinafter referred to as Soldani.

8. For **claim 1**, Kekki teaches sending from a first network element to a second network element by means of the radio network layer signaling protocol at least one parameter representative of transport quality of service or of quality of service for the transport network layer (see paragraph 45 lines 1-14), and

9. Kekki discloses *managing by the second network element uses said at least one parameter for transport quality of service management* (see paragraph 44 lines 1-6) *the for downlink transmission over an Iub interface between a controlling radio network controller and a Node B* (figure 1 shows an Iub interface is situated between a RNC and a NodeB; see paragraphs 0029-0036). Kekki discloses NBAP is a well-known signaling protocol used for sending transport channel information (see paragraphs 0040 and 0045). Kekki does not disclose using NBAP for uplink frame management. Soldani discloses the use of NBAP to manage the *uplink* quality via Node B reporting quality information to an RNC (see paragraphs 0076 and 0078). It would have been obvious to a person of ordinary skill in the art at the time of the

invention to manage the uplink transmissions in Kekki's invention to optimize the common channels in the uplink direction (Soldani, paragraph 0008).

10. **Regarding claim 2**, Kekki further teaches the first network element is a controlling network controller (see Fig. 1 Box 7).
11. **Regarding claim 3**, Kekki further teaches the second network element is a Node B or a base station (see Fig. 1 Box 6).
12. **Regarding claim 4**, Kekki further teaches the radio network layer signaling protocol is a Node B Application Part protocol applicable to the Iub interface between the controlling network controller and the Node B (see paragraph 45 line 9).
13. **Regarding claim 6**, Kekki further teaches a serving radio network controller (see Fig. 1 Box 17).
14. **Regarding claim 10**, Kekki further teaches the at least one parameter representative of transport quality of service is a specific parameter intended to indicate a transport quality of service level (see paragraph 45 lines 1-7).
15. **Regarding claim 11**, Kekki further teaches the at least one parameter representative of transport quality of service is at least one radio access bearer parameter (see paragraph 40 lines 4-6).
16. **Regarding claim 12**, Kekki further teaches the at least one radio access bearer parameter is the transfer delay (see paragraph 38 lines 1-5).
17. **Regarding claim 13**, Kekki further teaches the at least one radio access bearer parameter is the traffic handling priority (see paragraph 40 lines 4-10).

18. **Regarding claim 14**, Kekki further teaches the at least one radio access bearer parameter is the traffic class (see paragraph 45 lines 1-6).

19. **Regarding claim 16**, Kekki further teaches the at least one parameter representative of transport quality of service is at least one parameter that may be associated with a transport quality of service level or at least one radio access bearer parameter (see paragraph 40 lines 4-6 and paragraph 45 lines 1-6).

20. **Claims 7-8 and 35-36** are rejected under 35 U.S.C. 103(a) as being unpatentable over Kekki (US 2003/0161325) in view of Soldani, as applied to **claims 6 and 1 respectively** above, and further in view of Verma et al. (US 2005/0210154).

21. **Regarding claim 7**, the combination of Kekki and Soldani does not disclose the use of a drift radio network controller. However, Verma teaches a drift radio network controller (see paragraph 27 line 5). Thus, it would have been obvious to one of ordinary skill to use the system of Verma in the system of Kekki. The motivation for doing so is to increase the reliability of the system by continuing communications when the mobile drifts.

22. **Regarding claim 8**, Kekki further teaches the radio network layer signaling protocol is a RNSAP signaling protocol applicable to the Iur interface between radio network controllers (see paragraph 45 lines 7-11). The combination of Kekki and Soldani does not disclose the use of a drift radio network controller. However, Verma teaches a drift radio network controller (see paragraph 27 line 5). Thus, it would have been obvious to one of ordinary skill to use the system of Verma in the system of Kekki. The motivation for doing so is to increase the reliability of the system by continuing communications when the mobile drifts.

23. **For claim 35**, the combination of Kekki and Solidani discloses *managing, by the second network element, the transport quality of service according to said at least one parameter for transport quality of service management for uplink transmission over an Iur interface between serving radio network controller* (Kekki discloses the use of the Iur interface between RAN nodes; see paragraph 45 lines 7-11. Solidani discloses the management of uplink transmissions; see paragraph 0009).

24. The combination of Kekki and Soldani does not disclose the use of a drift radio network controller. However, Verma teaches a drift radio network controller (see paragraph 27 line 5). Thus, it would have been obvious to one of ordinary skill to use the system of Verma in the system of Kekki. The motivation for doing so is to increase the reliability of the system by continuing communications when the mobile drifts.

25. **For claim 36**, Kekki discloses *managing, by the second network element, the transport quality of service according to said at least one parameter for transport quality of service management for downlink transmission over an Iub interface between a radio network controller and a Node B* (see paragraph 45 lines 1-11).

26. The combination of Kekki and Soldani does not disclose the use of a drift radio network controller. However, Verma teaches a drift radio network controller (see paragraph 27 line 5). Thus, it would have been obvious to one of ordinary skill to use the system of Verma in the system of Kekki. The motivation for doing so is to increase the reliability of the system by continuing communications when the mobile drifts.

27. **Claims 20-22 and 31-34** are rejected under 35 U.S.C. 103(a) as being unpatentable over Widegren et al. (US 6,374,112) in view of Kekki (US 2003/0161325).

Regarding claims 20-22 and 31-34, Widegren teaches a radio network controller CRNC comprising means for signaling to a Node B in accordance with a signaling protocol of a radio network layer at least one parameter representing the quality of service for the transport network layer (see col. 8 line 55 - col. 9 line 4), for uplink transmission over the Iub interface between the radio network controller CRNC and the Node B (see col. 11 line 52 - col. 12 line 11 and col. 12 lines 33-45; The MSC determines the uplink and downlink QoS required for the call and sets up a radio access bearer to mobile station via the RNC. The RNC receives the setup request from the MSC and sets up the bearer between the RNC and Node B based on QoS.). Widegren does not explicitly disclose the signaling protocol used between the RNC and Node B to be the NBAP protocol.

However, Kekki does teach the NBAP protocol is used to signal the QoS, which includes a parameter to indicate a transport QoS level (see paragraph 45) in the NBAP radio link setup request message (see paragraph 40; The NBAP Radio Link setup request message is used to request a bearer and to signal the QoS of the bearer.). Thus, it would have been obvious to one of ordinary skill in the art to use the NBAP protocol in the manner taught by Kekki in the system of Widegren. The motivation for doing so is to follow the industry standards.

28. Claims **23-30** are rejected under 35 U.S.C. 103(a) as being unpatentable over Lee et al. (US 2002/0082020) in view of Willars et al. (US 6,889,050).

Regarding claim 23-30, Lee teaches a radio network controller SRNC comprising means for signaling to a radio network controller DRNC by means of a signaling protocol of a radio network layer corresponding to the RNSAP applicable to the Iur interface between radio network controller SRNC and radio network controller DRNC, where the signaling is a radio link setup

message (see paragraph 153; The radio link between the SRNC and DRNC is setup using an RNSAP message, and the radio link between the DRNC and the Node B is setup using a NBAP message.). Lee teaches all the subject matter of the claimed invention with the exception of including the QoS of the link in the setup messages.

However, Willars teaches signaling at least one parameter representing the quality of service for the transport network layer, for uplink transmission over the Iur interface between the serving radio network controller SRNC and the drift radio network controller DRNC and a Node B, wherein the parameter indicates a transport QoS level (see col. 9 lines 25-35 and col. 11 lines 24-50).

Response to Arguments

29. The arguments with respect to specification being enabling for the claimed means because the Applicant is using well-known structures in a new way are not persuasive because the consideration of the understanding of one skilled in the art in no way relieves the Applicant of adequately disclosing sufficient structure in the specification. *Atmel Corp. v. Information Storage Devices, Inc.*, 198 F.3d 1374, 1380 [53 USPQ2d 1225] (Fed. Cir. 1999).

30. The arguments with respect to Widegren not disclosing signaling of a radio network layer are not persuasive because the arguments appear to be based on piecemeal analysis because this feature was cited as being taught by Kekki.

Allowable Subject Matter

31. **Claims 15 and 17-19** would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to JEFFREY M. RUTKOWSKI whose telephone number is (571)270-1215. The examiner can normally be reached on Monday - Friday 7:30-5:00 PM EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kwang Yao can be reached on (571) 272-3182. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Jeffrey M Rutkowski/
Examiner, Art Unit 2473

/KWANG B. YAO/

Supervisory Patent Examiner, Art Unit 2473